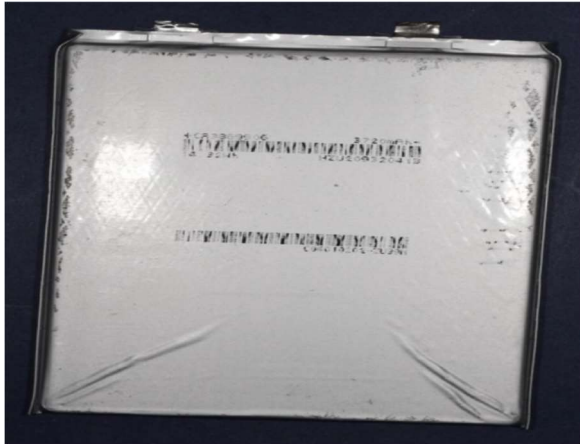

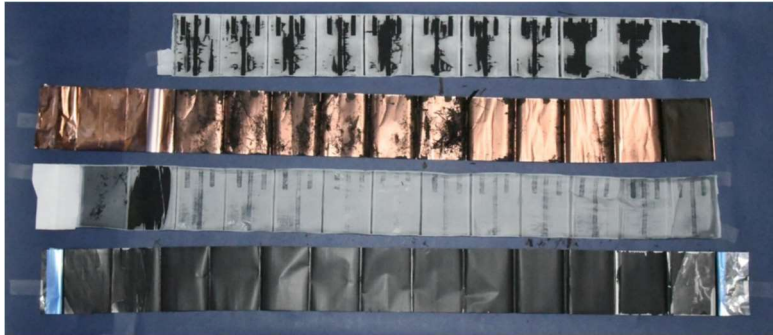
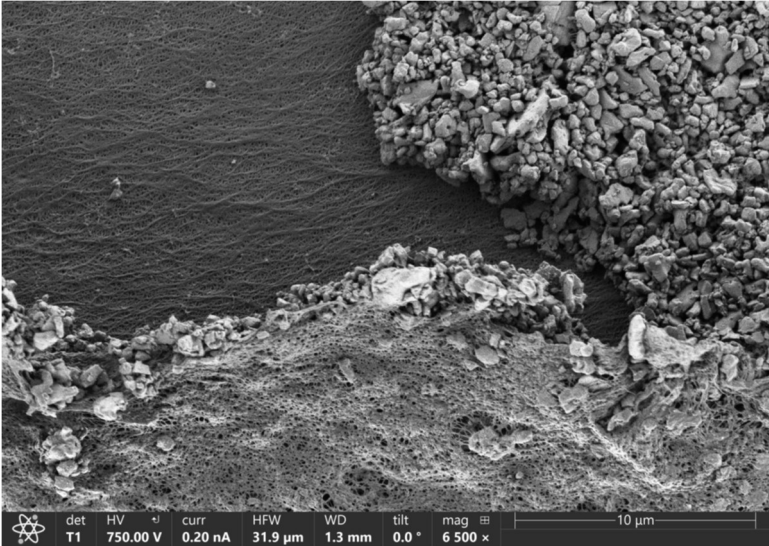
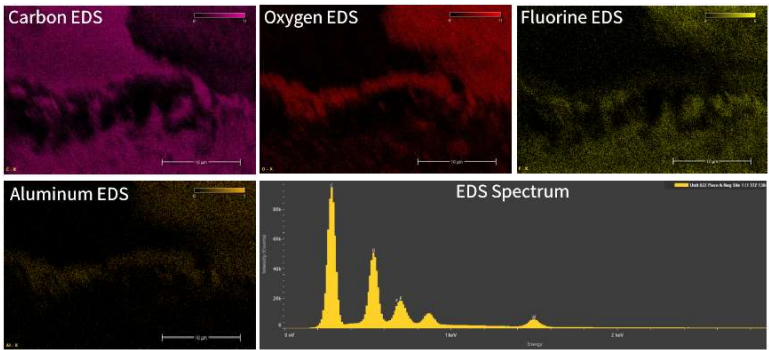
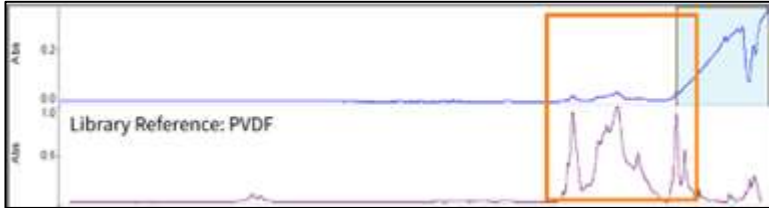


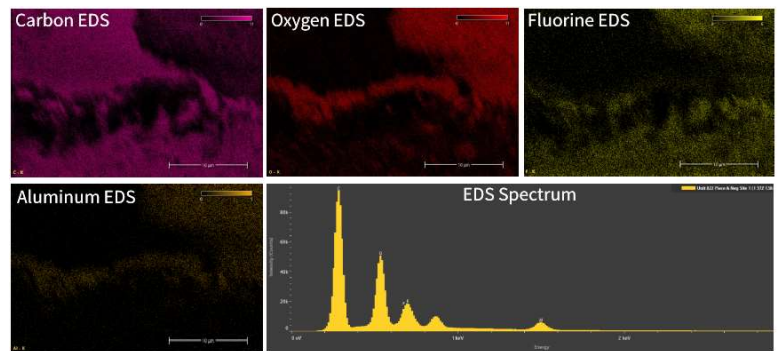
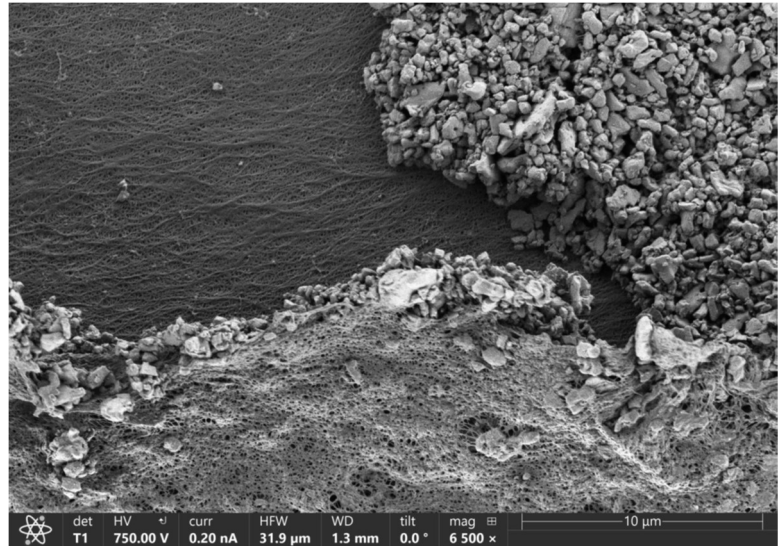
# EXHIBIT K

**Comparison of U.S. Patent No. 11,575,148 to the CosMX CA386990G Battery Cell**

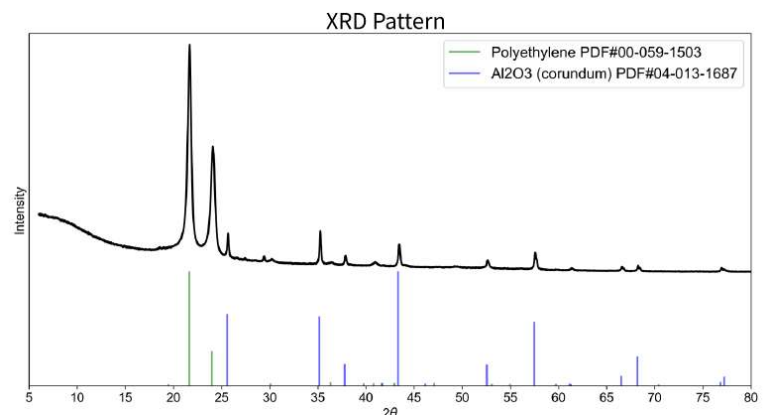
Claim 1	CosMX CA386990G Battery Cell
A porous film, comprising:	<p data-bbox="667 306 1451 380">The CA386990G battery has a separator that includes a porous film.</p>   

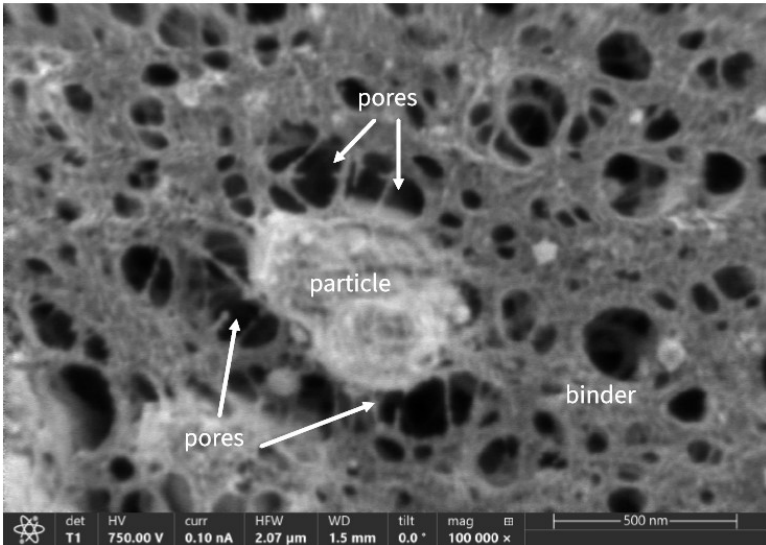
<p>a binder; and</p>	<p>The CA386990G battery cell's porous film includes a binder.</p> <p>For example, the scanning electron microscopy (SEM) image and the energy-dispersive X-ray spectroscopy (EDS) image of the separator shows the presence of a binder.</p>   <p>Additionally, the FTIR spectra of the separator also demonstrate the presence of a binder (PVDF).</p> 
<p>inorganic particles;</p>	<p>The CA386990G battery cell's porous film includes inorganic particles.</p>

For example, the SEM image and EDS image of the separator shows the presence of inorganic particles.



As further example, the X-ray diffraction (XRD) pattern of the separator showed inorganic particles ( $\text{Al}_2\text{O}_3$ ) are present.



<p>wherein the porous film comprises pores formed by the binder, the pores at least comprises a part of the inorganic particles,</p>	<p>The CA386990G battery cell's porous film comprises pores formed by the binder, and the pores at least comprises a part of the inorganic particles.</p> <p>For example, the SEM image of the separator surface shows pores formed by the binder, and the pores at least comprises a part of the inorganic particles.</p>  <p>The SEM image shows a porous structure with dark, irregularly shaped pores. A central, lighter-colored, roughly circular feature is labeled 'particle'. The surrounding material is labeled 'binder'. Two arrows point to specific dark regions, labeled 'pores'. At the bottom of the image, a technical data bar includes: 'det T1', 'HV 750.00 V', 'curr 0.10 nA', 'HPW 2.07 μm', 'WD 1.5 mm', 'tilt 0.0 °', 'mag 100 000 x', and a scale bar for '500 nm'.</p>
<p>wherein the inorganic particles have particle sizes that Dv10 is in a range of 0.015 μm to 3 μm, Dv50 is in a range of 0.2 μm to 5 μm, and Dv90 is in a range of 1 μm to 10 μm; Dv10 of the inorganic particles is less than Dv50 of the inorganic particles, and Dv50 of the inorganic particles is less than Dv90 of the inorganic particles, and the inorganic particles have particle sizes that the ratio of Dv90 to Dv10 is in a range of 2 to 100.</p>	<p>The CA386990G battery cell's porous film comprises inorganic particles with particle sizes in the ranges as claimed.</p> <p>For example, particle size distribution derived from the SEM image and digital image analysis demonstrates the value of Dv10 to be 0.29 μm, which is in the range of 0.015 μm to 3 μm. It also demonstrates the value of Dv50 to be 0.58 μm, which is in the range of 0.2 μm to 5 μm. It also demonstrates the value of Dv90 to be 1.04 μm, which is in the range of 1 μm to 10 μm. It further demonstrates the Dv10 is less than the Dv50, and the Dv50 is less than the Dv90. It further demonstrates the ratio of Dv90 to Dv10 is 3.6, which is in the range of 2 to 100.</p>



Example Particle Segmentation

